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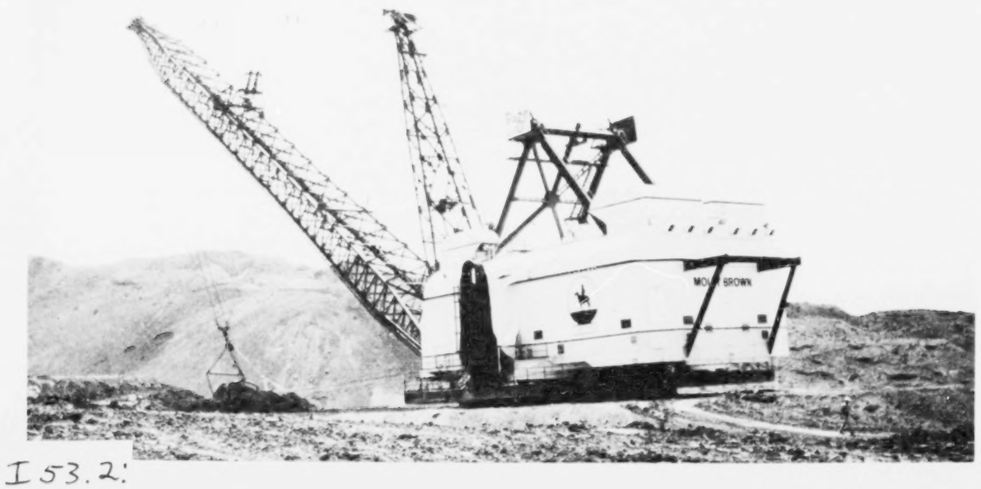
Bureau of Land Management
Colorado State Office

The Minerals Program for Colorado's Public Lands



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Introduction

The Bureau of Land Management (BLM) today administers what remains of the nation's once vast land holdings—the public domain. The public domain once stretched from the Appalachian Mountains to the Pacific Ocean. Of the lands originally owned by the United States, two-thirds went to individuals, industries and the states. Of that remaining, much was set aside for national forests, wildlife refuges, national parks and monuments, and other public purposes, leaving BLM to manage about 270 million acres—about one-eighth of the nation. BLM also manages the mineral estate underlying an additional 300 million acres which are administered or owned by other federal agencies or private interests.

With BLM's unique mandate of multiple use, management of the lands is based on balancing the use of lands and resources to obtain an ecologically sound environment, contribute to the mineral and energy needs of a strong economy, and provide a reasonable return to the federal treasury for the use of government lands and resources.

Although the federal government owns about 36% of Colorado's surface it owns, over 41% of the mineral estate.

Mineral development is an important land use within the BLM's multiple-use program. Mineral production on public land in Colorado involves three distinct systems: location, leasing, and material sale.

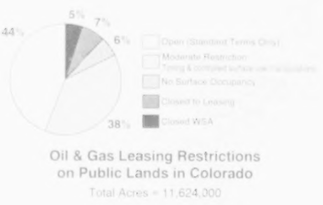
Location involves minerals like gold and silver under the general mining laws, such as the Mining Law of 1872. Miners locate claims to acquire mineral rights. When a valuable deposit is found, the mining claim may be patented and title obtained to both the mineral and surface land.

Oil and gas, coal, geothermal, sodium and other similar minerals are available through mineral leasing. Leases are issued for specific periods of time and the lessee pays a rental fee and royalties on the minerals produced. Common sand, gravel, and other construction and landscaping materials are available through material sales at fair market value or through free use permits to governmental agencies and nonprofit organizations.

Oil and Gas

Multiple-use planning allows BLM to determine how the resources on the public land should be used or allocated and how conflicts between various uses can be reduced or eliminated.

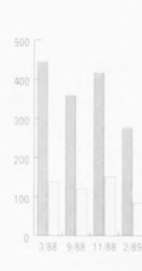
Planning actions are developed with public participation and are published in Resource Management Plans (RMPs). RMPs identify which lands are available for special uses such as recreation, wildlife, livestock grazing, minerals development or any number of other uses. For oil and gas, the RMPs identify which lands shall be closed to leasing and development, which lands are open to leasing and development under standard terms and conditions, which lands are open with additional stipulations or conditions to mitigate conflicts with other uses, and which lands are open with major restrictions on how operations may occur (e.g., no surface occupancy).



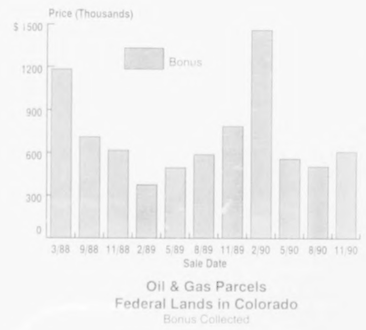
Oil & Gas Leasing Restrictions
on Public Lands in Colorado
Total Acres = 11,624,300

All public lands that are available for oil and gas leasing must first be offered through competitive leasing. Noncompetitive leasing takes place after a parcel has been offered competitively, but failed to receive a bid. As of September 30, 1989, there were 8,200 leases existing in Colorado on approximately 8 million acres.

Applications to conduct exploration, drilling, and production related activities are reviewed to ensure technical competence, environmental protection, and mineral resources conservation. Oil and gas activity fluctuates in response to oil and gas prices and general economic conditions. In 1989, over 800 wells were drilled, 98 of which were located on federal lands in Colorado. Currently, about 3,300 of the State's 12,000 producing wells are located on federal land.



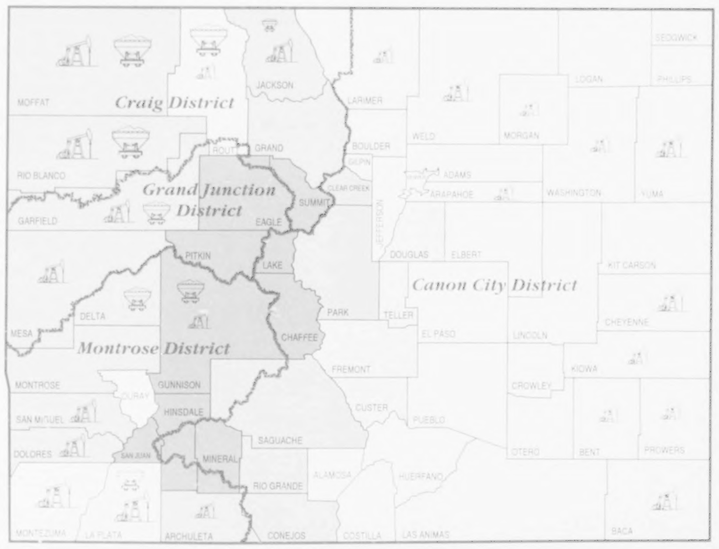
Oil & Gas Parcels
Federal Lands in Colorado
Offered & Sold

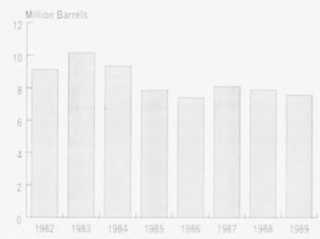


Oil & Gas Parcels
Federal Lands in Colorado
Bonus Collected

Royalties Collected from Energy Mineral Leases, Fiscal Year 1989

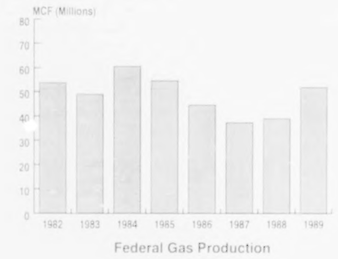
(shows percentage of county owned by the Federal Government)





Federal Oil Production

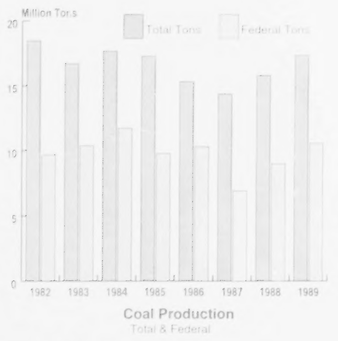
Oil & Gas Royalties Collected, FY 1989
Total: $32, 555, 073
$1,000,000 - $20,000,000
$100,000 - $1,000,000
$100 - $100,000
Coal Royalties Collected, FY 1989
Total: $16, 248, 952
$1,000,000 - $20,000,000
$100,000 - $1,000,000
$100 - $100,000
Percentage of County Owned by the Federal Government
Greater than 75% Federal
50% to 75% Federal
25% to 50% Federal
Less than 25% Federal



Federal Gas Production

Coal

During 1989, there were 103 existing coal leases in Colorado. Fourteen mines, containing 30 producing federal coal leases, produced 10.5 million tons of federal coal during the year.



Coal Production
Total & Federal

Locatable Minerals

The Mining Law of 1872 is the principal law through which metallic and nonmetallic locatable minerals on public lands are made available. The law encourages mining companies to self-initiate exploration and development. BLM must approve a plan of operations, including reclamation measures, for mining operations disturbing more than 5 acres of public land.

Colorado has approximately 82,000 mining claims on public lands with approximately 5,100 new claims filed in 1989. Although most of the major gold and other metallic mining in Colorado takes place on private lands, 70 notices and plans of operations for public lands were reviewed during 1990 and five patents were issued.

Other Mineral Programs

Although numerous hot springs and geothermal features exist in Colorado, no commercial geothermal activity has yet occurred on public lands in Colorado.

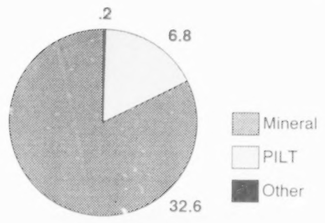
The Piceance Basin in western Colorado contains the largest deposits of high grade oil shale in the United States. Although considerable development work was done on two federal oil shale leases, neither tract is currently being developed.

Colorado presently has nine sodium leases in northwest Colorado. A pilot project is currently underway which will demonstrate whether the sizeable sodium resources in the Piceance Basin can be economically developed without damaging the oil shale resources associated with them.

The mineral materials program on public lands in Colorado mainly concerns the use of sand and gravel for concrete aggregate and fill and rock for aggregate, riprap and decorative purposes (flagstone and moss rock). Mineral materials may be sold at fair market value to interested parties and local governments or nonprofit organizations may obtain these materials free of cost for community purposes.

Impacts on Colorado

During 1989, $57,903,000 in royalties were collected on minerals produced from federal lands in Colorado. Half of this amount, or $28.9 million, was returned to Colorado. In addition, state and county governments obtained approximately $25 million from severance and ad valorem taxes on federal mineral production and $3.7 million from rental and bonus revenues. Since 1920, over $965 million in royalties have been paid on federal mineral production.



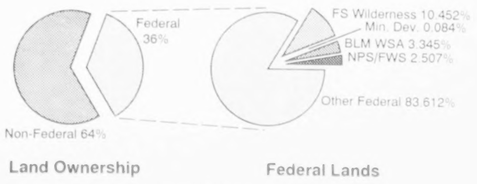
1989 Federal Revenues
to Colorado
in Millions of Dollars

In 1989, BLM in Colorado received $2.1 million in receipts from sale of timber, grazing, rights-of-way, and other miscellaneous collections; $167,000 was allocated to state and local governments. An additional payment in lieu of taxes (PILT) of $6.8 million was received by Colorado.

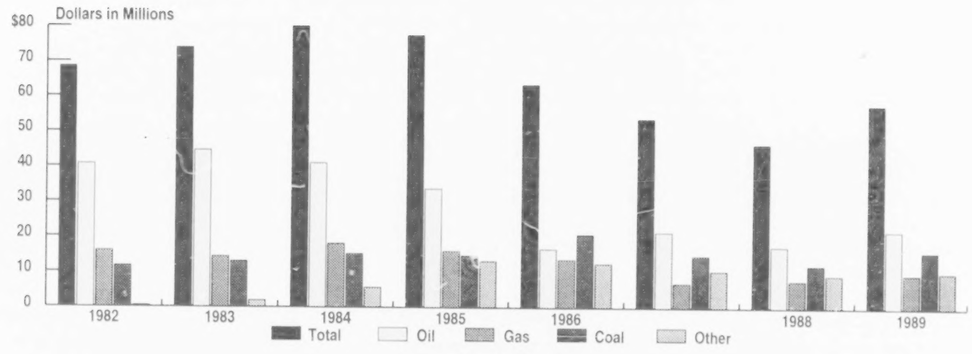
Colorado's federal minerals production compares to federal production in other states as:

- First highest carbon dioxide production
- Third highest natural gas production
- Third highest total federal mineral royalties production
- Fourth highest oil production
- Fourth highest coal production
- Fifth highest natural gas liquids production
- Sixth highest mining claims recordation

Presently, approximately 20,000 acres remain disturbed by active mineral operations on public land in Colorado. To put this into perspective, approximately 11,800 acres were disturbed by wildfires on BLM lands in 1989; 811,000 acres are set aside in BLM Wilderness Study Areas; 39,000 acres are identified as waterfowl habitat; and 7,900,000 acres are identified as big game habitat for 200,000 deer, 47,000 elk, and 12,500 antelope.



Land Uses
Federal Lands in Colorado



Mineral Royalties
Federal Lands in Colorado

Colorado
Over A Century of Mineral Development

The discovery of minerals (gold) came first, the founding of Colorado followed:

1858 Gold discovered along Cherry Creek, near the future Denver
1859 Gold discovered in the Black Hawk/ Central City area (Gregory Gulch)
1861 Colorado Territory established
1862 Oil discovered near Cañon City
1866-1870 Mineral discoveries at Lake City, Gunnison, Telluride, Idaho Springs, Leadville, Silver Cliff, Breckenridge, Aspen, etc.
1876 Florence oil field developed near Cañon City
1876 Colorado becomes a state
1879 U.S. Geological Survey established to determine mineral resources
1891 Gold discovered at Cripple Creek and Victor, last great gold rush
1902 Boulder and Rangely oil fields discovered and developed
1910-1920 Oil shale mining begins in Piceance Basin region
1914 World War I begins
1915-1918 Molybdenum and tungsten mining boom, operations begin at Climax mine
1920-1940 Coal mining activity at its peak in Routt, Moffat, Huerfano, Las Animas, Boulder, and Jefferson counties
1923 Oil discovered at Wellington Field, Larimer County
1933 Oil discovered at Rangely Weber field
1941 World War II begins for United States
1946 Bureau of Land Management created from Taylor Grazing Service and General Land Office
1948-1952 Uranium mining boom in western Colorado and eastern Utah. Atomic Energy Commission created to buy all uranium produced
1976 Federal Land Policy and Management Act passed, organic act for BLM
1982 U.S. Geological Survey Conservation Division and the BLM's Outer Continental Shelf office merged to create Minerals Management Service (MMS)

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